

A11101 295014

NAT'L INST OF STANDARDS & TECH R.I.C.



A11101295014

/Bulletin of the Bureau of Standards
QC1 .U5 V14:1918-19 C.1 NBS-PUB-C 1905





120
18098
Pat
DEPARTMENT OF COMMERCE

BULLETIN
OF THE
BUREAU OF STANDARDS

S. W. STRATTON, DIRECTOR

VOLUME 14
1918-19



WASHINGTON
GOVERNMENT PRINTING OFFICE
1919

National Bureau of Standards

SEP 2 1952

77307

QC1

.U5

Cap 2

CONTENTS OF VOLUME 14

No. 1

[Issued Apr. 6, 1918]

	Page.
295. DETERMINATION OF THE DEGREE OF UNIFORMITY OF BARS FOR MAGNETIC STANDARDS..... <i>Raymond L. Sanford</i>	1
296. THERMOELECTRIC MEASUREMENT OF CRITICAL RANGES OF PURE IRON... <i>George K. Burgess and H. Scott</i>	15
297. A STUDY OF ELECTROMAGNET MOVING COIL GALVANOMETERS FOR USE IN ALTERNATING-CURRENT MEASUREMENTS..... <i>Ernest Weibel</i>	23
298. STANDARD SUBSTANCES FOR THE CALIBRATION OF VISCOMETERS..... <i>Eugene C. Bingham and Richard F. Jackson</i>	59
299. AN "AVERAGE EYE" FOR HETEROCHROMATIC PHOTOMETRY, AND A COMPARISON OF A FLICKER AND AN EQUALITY-OF-BRIGHTNESS PHOTOMETER..... <i>E. C. Crittenden and F. K. Richtmyer</i>	87
300. EMISSIVITY OF STRAIGHT AND HELICAL FILAMENTS OF TUNGSTEN..... <i>W. W. Coblenz</i>	115
301. AN ANEROID CALORIMETER FOR SPECIFIC AND LATENT HEATS..... <i>Nathan S. Osborne</i>	133
302. WAVE LENGTHS OF THE STRONGER LINES IN THE HELIUM SPECTRUM..... <i>Paul W. Merrill</i>	159

No. 2

[Issued June 17, 1918]

303. RELATIVE SENSIBILITY OF THE AVERAGE EYE TO LIGHT OF DIFFERENT COLORS AND SOME PRACTICAL APPLICATIONS TO RADIATION PROBLEMS. <i>W. W. Coblenz and W. B. Emerson</i>	167
304. CALCULATION OF THE CONSTANTS OF PLANCK'S RADIATION EQUATION: AN EXTENSION OF THE THEORY OF LEAST SQUARES..... <i>Harry M. Roeser</i>	237
305. LUMINOUS RADIATION FROM A BLACK BODY AND THE MECHANICAL EQUIVALENT OF LIGHT..... <i>W. W. Coblenz and W. B. Emerson</i>	255
306. AN EXPERIMENTAL STUDY OF THE FAHY PERMEAMETER..... <i>Charles W. Burrows and Raymond L. Sanford</i>	267
307. NOTE ON ELECTRICAL CONDUCTION IN METALS AT LOW TEMPERATURES.. <i>Francis B. Silsbee</i>	301
308. REFLECTING POWER OF TUNGSTEN AND STELLITE..... <i>W. W. Coblenz and W. B. Emerson</i>	307
309. A METHOD FOR TESTING CURRENT TRANSFORMERS.... <i>Francis B. Silsbee</i>	317

No. 3

[Issued June 24, 1918]

310. SOME ELECTRICAL PROPERTIES OF SILVER SULPHIDE.... <i>George W. Vinal</i>	331
311. AXIAL ABERRATIONS OF LENSES..... <i>E. D. Tillyer and H. I. Schultz</i>	341
312. WAVE-LENGTH MEASUREMENTS IN SPECTRA FROM 5600 A TO 9600 A.... <i>W. F. Meggers</i>	371
313. SPECIFIC HEAT OF LIQUID AMMONIA..... <i>Nathan S. Osborne and Milton S. Van Dusen</i>	397

	Page.
314. THE LATENT HEAT OF PRESSURE VARIATION OF LIQUID AMMONIA.....	
<i>Nathan S. Osborne and Milton S. Van Dusen</i>	433
315. LATENT HEAT OF VAPORIZATION OF AMMONIA.....	
<i>Nathan S. Osborne and Milton S. Van Dusen</i>	439
316. GAS INTERFEROMETER CALIBRATION.....	<i>Junius David Edwards</i> 473
317. RESONANCE AND IONIZATION POTENTIALS FOR ELECTRONS IN CADMIUM VAPOR.....	<i>John T. Tate and Paul D. Foote</i> 479

No. 4

[Issued July 12, 1919]

318. APPLICATION OF DICYANIN TO THE PHOTOGRAPHY OF STELLAR SPECTRA..	<i>Paul W. Merrill</i> 487
319. INSTRUMENTS AND METHODS USED IN RADIOMETRY, III—THE PHOTO-ELECTRIC CELL AND OTHER SELECTIVE RADIOMETERS..	<i>W. W. Coblenz</i> 507
320. ADDITIONS TO THE FORMULAS FOR THE CALCULATION OF MUTUAL AND SELF INDUCTANCE.....	<i>Frederick W. Grover</i> 537
321. THERMAL EXPANSION OF ALPHA AND OF BETA BRASS BETWEEN 0 AND 600° C, IN RELATION TO THE MECHANICAL PROPERTIES OF HETEROGENEOUS BRASSES OF THE MUNTZ METAL TYPE.....	<i>P. D. Mercia and L. W. Schad</i> 571
322. PHOTOELECTRIC SENSITIVITY OF BISMUTHINITE AND VARIOUS OTHER SUBSTANCES.....	<i>W. W. Coblenz</i> 591
323. SOME CHARACTERISTICS OF THE MARVIN PYRHELIOMETER..	<i>Paul D. Foote</i> 605
324. WAVE LENGTHS IN THE RED AND INFRA-RED SPECTRA OF IRON, COBALT, AND NICKEL ARCS.....	<i>W. F. Meggers and C. C. Kiess</i> 637
325. SPECTRORADIOMETRIC INVESTIGATION OF THE TRANSMISSION OF VARIOUS SUBSTANCES.....	<i>W. W. Coblenz, W. B. Emerson, and M. B. Long</i> 653
326. ELECTRICAL OSCILLATIONS IN ANTENNAS AND INDUCTANCE COILS.....	<i>John M. Miller</i> 677
327. MEASUREMENTS ON THE INDEX OF REFRACTION OF AIR FOR WAVE LENGTHS FROM 2218 Å TO 9000 Å.....	<i>W. F. Meggers and C. G. Peters</i> 697
328. VARIANCE OF MEASURING INSTRUMENTS AND ITS RELATION TO ACCURACY AND SENSITIVITY.....	<i>Frederick J. Schlink</i> 741
329. MEASUREMENTS OF WAVE LENGTHS IN THE SPECTRUM OF NEON.....	<i>Keivin Burns, W. F. Meggers, and Paul W. Merrill</i> 765
INDEX TO VOLUME 14.....	777



